



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/632,587	08/04/2000	Kiyomitsu Takizawa	122.1414	1898

21171 7590 07/18/2003

STAAS & HALSEY LLP
SUITE 700
1201 NEW YORK AVENUE, N.W.
WASHINGTON, DC 20005

EXAMINER

KING, JUSTIN

ART UNIT	PAPER NUMBER
----------	--------------

2181

DATE MAILED: 07/18/2003

7

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/632,587

Applicant(s)

TAKIZAWA ET AL.

Examiner

Justin I. King

Art Unit

2181

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 01 May 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-9 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-9 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Specification

1. The title of the invention is too generic and is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

5. Claims 1-3 are rejected under 35 U.S.C. 103(a) as being unpatentable over KEEMUX KVM Switch by the Network Technology Inc..

Referring to claim 1: The KEEMUX by the Network Technology Inc. is the switch box, which allows user to simultaneously access and control Sun and Mac computers.

The claimed recognizing means for recognizing the power-on state is inherent in every KVM switch box; it is the inherent fundamental requirement for any KVM switch box to be able recognize each attached computer's power-on state in order to properly arrange the input devices' sequence on selecting attached computers for inputting commands.

The claimed selective inputting means for selectively inputting commands to one of the plurality of attached computers is inherent; because the switch box is meant to share a set of input device among multiple computers, it is the switch box's intended purpose to selectively inputting commands to a particular attached computer.

The claimed code transmitting means for transmitting power control command is inherent. It is any KVM switch box's inherent purpose to transmit any commands, which includes the power control commands. The KEEMUX switch box is designed to work with Sun and Mac, and the Sun and Mac's keyboards have the power-on and power-off buttons; such that the KEEMUX has to carry these power-on and power-off commands between the Sun and Mac's keyboard and the attached Sun and Mac computers.

The claim 1's preamble states that the attached keyboard does not have the power control keys, and the claim 1 claims that the PC switch has a plurality of power control switches corresponding to a plurality of computers. The KEEMUX does not have these limitations. However, the court has held that rearranging parts of an invention involves only routine skill in the art (*In re Japikse*, 86 USPQ 70). Therefore, it is considered that the rearrangement of the power control key from the Sun and Mac's keyboard to the KVM switch box only involves routine skill in the computer art. Hence, it would have been obvious to one having ordinary skill

Art Unit: 2181

in the computer art at time Applicant made the invention to adapt the routine skill in the art to the KEEMUX.

Referring to claim 2: Claim 2 is rejected over the KEEMUX as stated above; furthermore, the KEEMUX explicitly states its ability to broadcast keystrokes to computers for simultaneously start-up and shut-down. Both Sun and Mac's keyboard has one power-on key and one power-off key. It is inherent that the power-on key will only transmit power-on command, such that for any reason if any of the attached Sun or Mac computers are not power-on at the first press of the power-on key, the second press of the power-on key will retry to power these computers on.

Referring to claim 3: Claim 3 is rejected over the KEEMUX as the claim 2 stated above.

6. Claims 4-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over the combination of the KEEMUX KVM and Asprey (U.S. Patent No. 5,227,666).

Referring to claim 4: Claim 4 is rejected over the KEEMUX as stated above; although KEEMUX does not explicitly show the transistor and comparator, both transistor and comparators are inherent. The transistor is a common electrical component for constructing logic gates in electric system. Asprey teaches that it is know to employ both transistor and comparator to control unequal voltage between the computer and keyboard (abstract, figure 1). Hence, it would have been obvious to one having ordinary skill in the computer art to adapt Asprey's teaching into KVM because Asprey enables one to enhance KVM to better control the voltage between the keyboard and the computer.

Art Unit: 2181

Referring to claim 5: Claim 5 is rejected over the KEEMUX as the claim 4 stated above; furthermore, Asprey discloses the first and second voltage dividers (figure 1, structures 68, 72).

Referring to claims 6-9: claims 6-9 are rejected over the KEEMUX as stated above; furthermore, whether the comparator is driven by keyboard's power or computer's power is a designer's choice. It is the computer's power supply terminal's inherent purpose to supply power to an attached device. It is also a known practice for keyboard to supply the power; for instance, the Quickcam has an adapter to connect to keyboard.

Response to Amendment

6. In response to Applicant's argument that the prior art fails to teach each power control command will only be sent when the associated computer device is selected (Remark, page 5's last 2 paragraphs, page 6's first paragraph): The KEEMUX has the scan, broadcast, and command modes. The command modes will only send command to the computer, which is selected.

7. In response to Applicant's argument that the KEEMUX fails to teach the simultaneously powering all connected computers and turning off selected computers (Remark, page 6's claim 2's 2nd paragraph): The KEEMUX has the scan, broadcast, and command modes; such that the KEEMUX does simultaneously power all connected computers and turn off selected computers.

8. In response to Applicant's argument that the KEEMUX fails to teach the selectively powering via the keyboard control key (Remark, page 7's 2nd paragraph): Each KVM's basic feature is to share one set of control devices among multiple computers, such it has the ability to selectively pass commands only to the selected computer, which KEEMUX implements in its

Art Unit: 2181

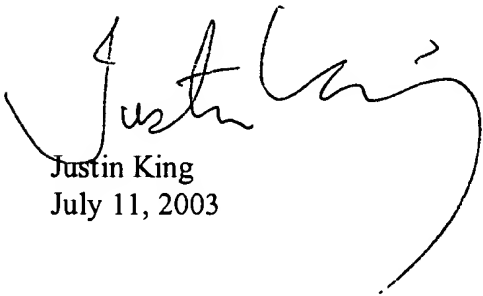
command mode. As Examiner indicated in the previous action, some keyboards from both Mac and Sun equip this power control key, and the keyboard with power control key is also known via Simon et al. (U.S. Patent No. 5,629,694). Such that, the KVM switch will forward any command from the keyboard to the selected computer including the power control command.

Conclusion

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Justin King whose telephone number is (703) 305-4571. The examiner can normally be reached on Monday through Friday from 9:00 A.M. to 5:00 P.M..

If attempts to reach the examiner by telephones are unsuccessfully, the examiner's supervisor, Mark Reinhart can be reached at (703) 308-3110.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose number is (703)-306-5631.


Justin King
July 11, 2003


GOPAL C. RAY
PRIMARY EXAMINER
GROUP 2300